Broadband

## DS2500 QAM Analyzer Triple Play Maintenance Tool

## Key Benefits

DOCSIS 3.0 (8X4) channel bonding

DEVISER

- USB storage and firmware upgrade
- Communicate with PC via Ethernet
- High resolution 4 inch TFT LCD
- Upstream QAM Source w/Sweep mode
- MER & BER
- QAM, QPSK, COFDM
- Auto & Limit Tests
- Voltage measurement



The DS2500 series QAM analyzer is designed for effective HFC network maintenance, troubleshooting, and maintenance applications. The compact unit QAM analyzer provides complete measurement capabilities of QAM and Analog TV Signal, Cable Modem, and Ethernet over Cable (EOC).

This versatile analyzer boasts a high-resolution color LCD display and an intuitive user interface allowing the technician to easily and quickly perform accurate network tests.

With the added DOCSIS 3.0 Cable Modem test feature, complete network testing is possible in the palm of your hand--including CMTS registration, CM Statistics, Ping, FTP, and Web Browser.

0AM			[8	]-PL	AN F	9		20:5	57:0
CH: CENT: 33	121 31.00MHz	-	*			-		•	4
STD: BU:	J.83A 8.00MHz		٠	•	•	*	k		
SR: 6.	875MS/s		•	*	٠	*	۰.	Þ.	
Pre-BER	64QAM	٠		•	٠	٠	٠	*	٠
<1	L.0E-09	۰.	٠						9
Post-BE	R: L.OE-09		۲	٠	٠	٠	•		
MER:	34.4dB		8	٠		•			۰
SR: 6	.875 HS/s		٩	٠	*	¥		۶	*

GRM SOURCE	er 🔍 🔍	[A]-PLAN A	21:01:38
<b>RF OF</b>	F	э	E 60
FREQ:	50.00 MHz		50
MODE:	160AH		- 40
SR:	1280 ksps	and the second sec	- 30
SHIFT:	0.0 dB		20
LEVEL:	0.0		- 10
	0.0 dBmV		F 9
Signal is	stopped!		-10
SETUP	START	SELECT	SAVE

QAM Constellation

QAM Source Generator

BER	•	[A]-PLA	N A	15:12:12
40				
1E+4				
30				
1E+2		1		
i ul L-t-				
10				
ES III I SES				
PRE-BER : (1.08	-09 ES :	51 sec	COR :	1.0420E+03
POST-BER: <1.0	-09 SES :	17 sec	UNCOR:	3.76532+06
MER : 33.2	dB TIME:	5 min	SUH :	6.6892E+09
TOTAL PRE-BER	: 5.6E-04	TOTAL PO	ST-BER	: 5.6E-04
CH: 121 MODE:	640AH /	J.83A SR	R 6.875	i MS/s

[A]-PLAN A RETURN PATH 0 21:01:06 REF: 20dBmV RBU: 300K TRC: POS SCALE: 10dB/-> CENT: 35.00MHz SPAN: 60.00MHz AVG: DISABLE DELTA(A-B) MARK A . MARK B 25.00MHz -39.4dBmV 45.00MHz -20.00 MHz -46.5dBmV 7.1dB AUTO MARK MODE >> AMP

**BER Statistics** 

## **Specifications**

opoemeanons		
Frequency		
Frequency Range	5 MHz to 1000 MHz	
Frequency Accuracy	±10 ppm × 10 <sup>6</sup>	
Frequency Resolution	10 kHz	
QAM / DVB-C		
Power Level	-30dBmV to +50 dBmV	
Level Resolution	0.1 dB	
Level Accuracy	±1.5 dB (C/N >20 dB)	
MER	~ 40 dB	
MER Accuracy	±2 dB	
BER	1E-3 ~ 1E-9 (Pre/Post RS)	
BER Statistics	Yes	
Modulation Type	16/32/64/128/256 QAM ITU-T J.83 ANNEX A/B/C	
Constellation	Yes	
Analog CATV		
Level	-30dBmV to +60 dBmV	
Level Resolution	0.1 dB	
Level Accuracy	±1.5 dB	
Other Functions	C/N, V/A, Tilt, Limit Test, Auto Test, Channel Sweep/Management, Line Voltage	
Spectrum Analysis		
Input Level Range	-50 dBmV to +60dBmV	
Level Resolution	0.1 dB	
Level Accuracy	±1.5 dB	
Display Dynamic Range	80 dB	
RBW	30 kHz / 100 kHz / 300 kHz / 1 MHz / 3 MHz (Self-Adapt)	
Sweep Time	300 mSec/ Field (8MHz)	
Span	995 Mhz (Maximum)	
Return Path Noise Test	Yes	
QAM Source		
Frequency	5 to 65 MHz	
MER	>38 dB	
Modulation Type	8/16/32/64 QAM, QPSK, CW	
inouulution ijpo	0/10/32/04 dam/ di 3K, CM	
Symbol Rate	5.12/2.56/1.28 MSym/s, 640/320/160 KSym/s	
Symbol Rate Output Level Range		
Symbol Rate	5.12/2.56/1.28 MSym/s, 640/320/160 KSym/s	
Symbol Rate Output Level Range	5.12/2.56/1.28 MSym/s, 640/320/160 KSym/s	
Symbol Rate Output Level Range General	5.12/2.56/1.28 MSym/s, 640/320/160 KSym/s +8 dBmV to +60 dBmV 247mm (9.7") x 130mm (5.1") x 67mm (2.7") 1160 g (2.6 Lbs.)	
Symbol Rate Output Level Range General Dimensions	5.12/2.56/1.28 MSym/s, 640/320/160 KSym/s +8 dBmV to +60 dBmV 247mm (9.7") x 130mm (5.1") x 67mm (2.7")	
Symbol Rate Output Level Range General Dimensions Weight	5.12/2.56/1.28 MSym/s, 640/320/160 KSym/s +8 dBmV to +60 dBmV 247mm (9.7") x 130mm (5.1") x 67mm (2.7") 1160 g (2.6 Lbs.)	

**Retrun Path Spectrum** 

©2014 Deviser Instruments Incorporated. 780 Montague Expressway, Suite 606, San Jose, CA 95131. All rights reserved. Specifications subject to change without notice. All product and company names are trademarks of their respective corporations. Deviser Instruments manufacturing facilities are ISO 9001 certified. Do not reproduce, redistribute, or repost without written permission from Deviser Instruments. DS2500 140921